General Mining, LLC Endomines Idaho, LLC -ETH, 5/8/18

Friday Exploration Project Stormwater Pollution Prevention Plan

Prepared for:

General Mining, LLC 254 W. Hanley Ave. Coeur d'Alene, ID 83815

Endomines Idaho, LLC 4135 Valley Commons Drive, Unit D Bozeman, MT 59718 -ETH 5/8/18

Prepared by:



Project Management, Engineering, and Environmental Services

October 2015

Contents

1.0 Introduction	1
1.1 Person(s) Responsible Parties	1
1.2 Pollution Prevention Team	2
2.0 Project/Site Information	3
2.1 Project Description	3
2.2 Receiving Waters	4
3.0 Potential Pollution Source	6
3.1 Activities in the Area	7
3.2 Spills and Leaks	7
3.3 Unauthorized Non-Stormwater Discharges	8
4.0 Control Measures	10
4.1 Best Management Practices, Erosion, and Sediment Control	10
4.2 Erosion and Sediment Control	12
4.3 Other Controls	12
4.4 Inspections and Assessments	14
4.5 Quarterly Visual Assessment Procedures	16
4.5.1 Quarterly Visual Assessment Documentation	16
4.5.2 Exceptions to Quarterly Visual Assessments	17
4.6 Monitoring	18
4.6.1 Benchmark Monitoring (General Areas)	18
4.6.2 Impaired Stream Monitoring Requirements	20
4.6.3 Monitoring Documentation	20
4.6.4 Waste Rock and Overburden	20
5.0 Endangered, Threatened Species, and Critical Habitat	22
6.0 Historic Properties	23
7.0 Cartification and Notification	24

Stormwater Pollution Prevention Plan (SWPPP) General Mining,

LLC Endomines Idaho, LLC -ETH 5/8/18 - Friday Exploration Project

Tables:

Table 1:	Stormwater	Pollution	Prevention	Team
I uoic I.	Diolili Water	1 Ollunoll	1 10 101111011	1 Cuiii

Table 2: Proposed Disturbance Area

Table 3: Names of Receiving Waters

Table 4: Impaired Waters / TMDLs

Table 5: Industrial Materials

Table 6: Industrial Materials Quantities

Table 7: BMP Summary Table

Table 8: Allowable Non-Stormwater Discharges

Table 9: Benchmark Parameter and Concentration List

Appendices:

Appendix A – Site Figures

Figure 1: Location Map

Figure 2: Aerial Photograph

Figure 3: Site Map

Figure 4: Site Map with BMP Installations -ETH 5/8/18

Appendix B – SWPPP Forms, Agreements, Logs

Form A: Employee Training Forms

Form B: Routine Facility Inspection Reports

Form C: Delegation of Authority Form

Form D: Subcontractor Certification and Agreement

Form E: SWPPP Amendment Log

Form F: Active/Inactive Status Change

Form G: Site Stabilization Log

Form H: Significant Spills, Leaks, or Other Releases

Appendix C – MSGP

Appendix D – Notice of Intent

Appendix E – Endangered Species Act Compliance Documents

Stormwater Pollution Prevention Plan (SWPPP) General Mining,

LLC Endomines Idaho, LLC -ETH 5/8/18 - Friday Exploration Project

1.0 Introduction

The Stormwater Pollution Prevention Plan (SWPPP) was prepared using good engineering practices and industry standards relating to management of storm water from exploration projects. The SWPPP was developed by Klepfer Mining Services (KMS); they have been involved with various companies assisting with development of SWPPPs that have been approved by EPA and other authorities. This plan covers the Friday Exploration Project that is operated by General Mining, LLC (GM) Endomines Idaho, LLC. This is an underground exploration project located near Orogrande, Idaho.

1.1 Person(s) Responsible Parties

Operator(s)

General Mining, LLC Endomines, Idaho, LLC 254 W. Hanley Ave. 4135 Valley Commons Drive, Unit D Coeur d'Alene, ID 83815 Bozeman, MT 59718 (843) 290-8930 (406) 624-6733

Legally Responsible Person(s)

John Ryan – General Manager Zachary Black - Endomines Idaho Technical Director/President -ETH 5/8/18 Contact – Same as above

Authorized Representative

-ETH 5/8/18

Erik Hayes (Endomines Idaho Environmental Manager), an on-site Project Manager, or other similar responsible position associated with the project.

In addition, KMS, a subcontractor, will be an authorized representative.

Klepfer Mining Services, LLC Eric Klepfer 2257 W. Dakota Ave. Hayden, ID 83835 208-772-6993 eric@klepfermining.com

KMS will provide technical assistance to GM on the use and maintenance of the SWPPP. As such, KMS will be the authorized representative related to the SWPPP. Mr. Klepfer has a degree in mining engineering and over 30 years of mining experience, much of it associated with environmental issues. The Project Manager will also have authority to address SWPPP management issues.

Emergency 24-Hour Contact:

John Ryan - (843) 290-8930 Zachary Black (720) 648-2625 ETH 5/8/18

1.2 Pollution Prevention Team

The following table identifies the staff involved with the development of the SWPPP; these individuals will be charged with maintaining the SWPPP as well as managing implementation of the control measures at the site. Every member of the team will have access to the SWPPP, associated forms, and other information pertinent to the SWPPP and their particular responsibilities. The SWPPP will be kept on site during exploration activities. Otherwise, the team member will carry the plan with them while at the site. If there are changes to the Stormwater Pollution Prevention Team, those changes will be made to the table and updated contact sheets will be added to the SWPPP and kept on file for the project.

Table 1: Stormwater Pollution Prevention Team

Team Member	Title	Responsibilities/Duties
John Ryan Erik Hayes	Environmental Manager -ETH 5/8/18	Oversight, Development, Implementation, Maintaining Control Measures, Corrective Action, Inspections and Monitoring
Jessica Klepfer	Environmental Scientist	Development/Implementation/Administration
Daniel Matsche	Environmental Scientist	Implementation, Maintaining Control Measures, Corrective Action, Inspections and Monitoring
Eric Klepfer	Engineer	Oversight, Development, Inspections and Monitoring

Contact (KMS Staff):

erik.hayes@endomines.com

eric@klepfermining.com

jessie@klepfermining.com

daniel@klepfermining.com

2.0 Project/Site Information

General Mining, LLC
Endomines Idaho, LLC
Friday Exploration Project
0.10 miles east of Orogrande
Orogrande, Idaho 83525
Idaho County

Project Latitude/Longitude

(Use **one** of three possible formats, and specify method)

Latitude:	Longitude:
1. 45 ° 42' 12.9" N (degrees, minutes,	1. 115° 32' 27.3" W (degrees, minutes,
seconds)	seconds)
2°'(degrees, minutes, decimal)	2 °'(degrees, minutes, decimal)
3 o N (decimal)	3 ° W (decimal)
Method for determining latitude/longitude:	
USGS topographic map (specify scale: _)
Other (please specify): Google Earth	
Horizontal Reference Datum:	
☐ NAD 27 ☐ NAD 83 or WGS 84	Other: Google Earth

2.1 Project Description

The Friday Exploration Project is located in Idaho County near the town of Orogrande, Idaho on private land. The project is an underground mining and exploration program that will include the following:

- Laydown Area;
- Development Rock Storage Area;
- Fuel Storage;
- Portal;
- Soil Stockpiles;
- Roads:
- Generators/Compressors; and
- Other Ancillary Facilities.

The area associated with the project will have contact and non-contact stormwater. The contact stormwater will be limited to a small area near the portal that will comingle with mine water. The remaining area will be non-contact water and is not subject to discharge restriction as

required for mine water. The non-contact water will be managed in accordance with the SWPPP.

The footprint for the full project is approximately 6.1 acres. **Figures 1-2** show the general location of the project. **Figure 3** shows the project layout. This figure also provides details of the Stormwater Pollution Prevention Plan (SWPPP) that are described throughout this document.

Table 2: Proposed Disturbance Areas

Activity Type	Proposed Disturbance	Size (acres)
Vehicle/Equipment Operation	Access Road	
Material Storage Vehicle/Equipment Operation	Laydown Area	
Compressor/Generator	Ancillary Support Area	
Equipment/Vehicle	Haul Road/Development Rock Storage Area	
Total Proposed Disturbance		6.1

Figure 3 shows the stormwater management approach and the flow direction. Contact water flow direction is also shown on **Figure 3**; demonstrating segregation from non-contact stormwater. The overall objective is to use natural barriers to avoid direct discharge to the local stream system. Infiltration and dispersed flow management will be used to minimize flows and reduce sediment. Additionally, a Figure 4 has been added to provide BMP installation notes as they are implemented. Figure 4.

2.2 Receiving Waters

The stormwater management plan intends to capture/divert stormwater to avoid any discharges to local stream systems. The only receiving waters are Crooked River and Quartz Creek.

Idaho Department of Environmental Quality's (IDEQ) 2012 Integrated Report was reviewed to determine the classification of the receiving waters. Crooked River was identified as impaired under the §303(d) listing for the South Fork Clearwater drainage and is identified as a Category 4a – Impaired Waters with EPA Approved TMDL (water and temperature).

Table 3: Names of Receiving Waters

Name(s) of the first surface water that receives stormwater directly from the site

1. Crooked River

Table 4: Impaired Waters / TMDLs

	Is this surface	If you answered yes, then answer the following:		
	water listed as "impaired"?	What pollutant(s) are causing the impairment?	Has a TMDL been completed?	Title of the TMDL document
1.	Crooked Riv	ver		
	⊠ YES □ NO	Temperature, Water	⊠ YES □ NO	Idaho 2012 Integrated Report – IDEQ Jan 2014

3.0 Potential Pollution Source

This section describes the potential pollution sources associated with the project that could be exposed to stormwater. No activities have occurred on the project site for the previous 3 years.

Table 5: Industrial Materials

Pollutant-Generating Activity	Pollutants or Pollutant Constituents	Location on Site
Vehicle and Equipment Operation	Diesel fuel, lubricants and oils	Laydown Area, Development Rock Storage Areas, Access and Haul Roads
Explosives Storage	Nitrates	Laydown Area

Table 6: Industrial Materials Quantities

Pollutant	Maximum Quantity
Diesel Fuel	500 Gallons
Regular Gasoline	100 Gallons
Lubricants	25 Gallons
Explosives	1,000 lbs.

The list of material shown above will be present during active exploration activities. Materials will only be on site during periods when exploration activities are underway.

All materials associated with the project will be stored in their original containers (oils, lubricants, etc.) or in designed tanks (i.e., fuel). Good housekeeping practices will be followed to minimize degradation of the products and include keeping all chemical products' lids/containers closed and not exposed to precipitation. Therefore, the potential for stormwater to include these industrial materials is very unlikely.

Material handling procedures will be in place and followed by suppliers, contractors, sub-contractors and employees, the potential for pollutants associated with stormwater will be

limited to sediment. Using good housekeeping and material management practices will reduce the potential for stormwater discharges to include hydrocarbons or other associated industrial materials.

Best Management Practices (BMPs) as described in the SWPPP will minimize sediment content in the discharges. Those same controls will minimize sediment loads generated from disturbed areas.

3.1 Activities in the Area

The project is an underground exploration program with much of the activities occurring underground and not exposed to precipitation. The activities subject to the SWPPP will be limited to the laydown area, roads, and other areas shown on **Figure 3 and/or Figure 4**.

Table 7: BMP Summary Table

Activity Area	Pollutant Source	Pollutant	BMPs
Access and Haul Roads, Laydown Areas	Industrial Material Storage Disturbance Surface	Diesel, Gasoline, Lubricants, Sediment, and Drilling Fluids	Good Housekeeping Preventative Maintenance Spill and Leak Response Plan Spill Response Kits Proper Material Storage/Handling Secondary Containment Sediment Fence, Straw Bales, Water Bars
Compressor/Generator	Industrial Material Disturbance	Diesel, Gasoline, and Lubricants	Sediment Fence, Straw Bales, Water Bars Good Housekeeping Preventative Maintenance Spill and Leak Response Plan Spill Response Kits Proper Material Storage/Handling Secondary Containment

3.2 Spills and Leaks

This facility will have a Spill Response Plan which will specifically identify all potential areas of spills or leaks, and define the proper measures for control and cleanup. For each facility area, specific procedures will be established to minimize spill potential. At a minimum, those procedures will identify the following:

- Procedures for plainly labeling containers (oil, fuels, lubricants, etc.) that could be susceptible to spillage or leakage will be implemented to encourage proper handling and facilitate rapid response if spills or leaks occur;
- Preventative measures such as barriers between material storage and traffic areas, secondary containment provisions, and procedures for material storage and handling;

- Procedures for expeditiously stopping, containing, and cleaning up leaks, spills, and other releases;
- Procedures for notification of appropriate facility personnel, emergency response agencies, and regulatory agencies; and
- Describe where each control is to be located, or where applicable measures will be implemented.

Familiarity with spill response procedures will occur by regularly implementing the following:

- Frequent visual inspection of pumps, lines, seals, hoses, and other devices with high spill potential;
- Frequent preventive maintenance to replace parts and equipment prior to failure;
- Use of puncture/break resistant storage containers for chemicals and materials; and
- Provide adequate personal protective equipment to maintain worker safety and attention.

In the event of a spill or leak, a Spill Response Plan will be made available to all employees. This plan will specify the methods that will be followed in order to respond to a spill as quickly as possible. The plan will outline the following:

- Location of the leak and identification of the leaking material;
- Assessment of personnel protection requirements;
- Stop the leak;
- Isolate and contain the spilled material;
- Management and agency notifications;
- Spill cleanup and disposal of material; and
- Investigation of the cause of the spill.

The Spill Response Plan also provides for the maintenance of adequate spill cleanup materials, personnel protection equipment, and their locations as well as employee training for their use. Employees are regularly trained how to respond to a spill and use the Emergency Procedure Plan. A log of any significant spills or leaks will be kept with the SWPPP, a log sheet is available in **Appendix B (Form H)**.

3.3 Unauthorized Non-Stormwater Discharges

An assessment of planned activities was completed as part of the development of the SWPPP. The following table lists the allowable non-stormwater discharges that are permitted under the

guidance of the Multi-Sector General Permit (**Appendix C**). GM does not plan for or expect any of the following discharges to be present at the site with the exception of dust control.

Table 8: Allowable Non-Stormwater Discharges

Tuble of Time waste from Storm water Discharges		
Type of Allowable Non-Stormwater Discharge	Likely to be Present at Site?	
Discharges from emergency firefighting activities	☐ YES ⊠ NO	
Fire hydrant flushings	☐ YES ⊠ NO	
Landscape irrigation	☐ YES ⊠ NO	
Waters used to wash vehicles and equipment	☐ YES ⊠ NO	
Water used to control dust	∑ YES □ NO	
Potable water including uncontaminated water line flushing	☐ YES ⊠ NO	
Routine external building wash down	☐ YES ⊠ NO	
Pavement wash waters	☐ YES ⊠ NO	
Uncontaminated air conditioning or compressor condensate	☐ YES ⊠ NO	
Uncontaminated, non-turbid discharges of ground water or spring		
water	☐ YES ⊠ NO	
Foundation or footing drain	☐ YES ⊠ NO	
Construction dewatering water	☐ YES ⊠ NO	

GM will ensure that application of water for dust control will be applied at the appropriate rate to minimize any run-off from disturbed areas. The BMPs that will be implemented will also control a small amount of run-off from dust control. The likelihood of discharge of non-stormwater will be minimal.

4.0 Control Measures

This section describes the procedures, methods, and schedules relating to control measures and stormwater management as required under Part 2 of the Multi-Sector General Permit (MSGP) (**Appendix C**). Control measures considered the following criteria:

- Prevent stormwater from coming into contact with polluting materials;
- Using control measures in combination to isolate potential pollution in the stormwater discharges;
- Design control measures appropriate for the type/quantity of pollutants at the project;
- Minimize impervious areas;
- Use flow attenuation, swells, natural depressions, vegetative cover to reduce in-stream impacts; and
- Conserve/restore riparian buffers and barriers.

4.1 Best Management Practices, Erosion, and Sediment Control

GM Endomines Idaho, LLC will, to the extent feasible, implement and maintain the following items as minimum BMPs to meet technology and water quality based criteria:

- Good Housekeeping Proper handling, storage and covering of industrial materials, dust control, material tracking, minimize stormwater discharges and Non-Stormwater Discharges (NSWD);
- <u>Preventative Maintenance</u> Identify spill sources, inspect equipment, perform regular maintenance, set protocols and procedures for maintenance/fueling, regularly inspect installed BMPs;
- <u>Spill and Leak Prevention</u> Set protocols and procedures to minimize spills and leaks, develop spill and leak response procedures, prompt response and cleanup of spills, and ensure proper response kits are available and appropriate for the specific industrial materials on site:
- Material Handling and Waste Management Minimize handling required for industrial materials to reduce potential for spills, store industrial materials in proper containers and/or properly dispose of waste materials generated at the project, use proper containment and cover to reduce exposure to precipitation, properly manage run-off away from industrial materials, quickly respond to spills, and properly clean equipment regularly that may be contaminated by industrial materials;

- <u>Erosion and Sediment Control</u> Implement effective wind erosion controls, stabilize inactive areas/slopes prior to a forecasted storm event, maintain effective perimeter controls, and manage run-off away from erodible areas;
- <u>Employee Training Program</u> Prepare effective training programs for employees that will be performing various tasks for the project, identify which employees should be trained, develop a training schedule and procedure, and maintain records on training efforts; and
- Record Keeping Develop protocol and procedures to ensure implementation of the SWPPP including the monitoring and sampling plan, track to ensure SWPPP program is implemented accurately and modified as necessary to reduce stormwater impacts through inspections, maintain records (for 5 years) to demonstrate compliance with the SWPPP and the Multi-Sector General Permit.

GM Endomines Idaho, LLC will also, to the extent feasible, implement advanced BMPs for the project as required and may include:

- Exposure Minimization Use proper storage containers/covers to reduce exposure to precipitation and/or spill in the work areas;
- <u>Stormwater Containment and Discharge Reduction BMPs</u> Use berms, diversions, ditches, water bars and other methods to minimize stormwater contact with industrial areas to enhance infiltration of stormwater versus run-off:
- <u>Treatment Controls</u> Implemented as appropriate, if other BMPs are not effectively working at the site, and will be developed as appropriate to address site specific issues identified through inspections and/or sampling;
- Other Advanced BMPs Site specific advanced BMPs may be necessary to meet permit conditions and will be implemented as appropriate.

4.2 Erosion and Sediment Control

The project is subject to Part 8.G of the MSGP regarding control measures. **Figures 3 and 4** show the proposed control measures that will be implemented for the project. It is anticipated that no discharge will occur to Crooked River or Quartz Creek based on the arrangement of the project and existing topography. Natural barriers are present throughout the project area to reduce the opportunity for stormwater to flow into the local stream system.

The remaining sediment control measures shown on **Figures 3 and 4** will be implemented in advance of construction activities. Where possible, ditches/berms will manage water and divert and disperse water onto vegetated areas. If installation of control measures is not possible before construction, they will be installed as soon as practicable. Sediment basins are not anticipated to be required to support storm water control.

Erosion and sediment control measures will be properly sized to the anticipated frequency, intensity, and duration of precipitation events. Designs will also consider the erosive nature of the soil exposed. All designs will direct stormwater run-off to vegetative areas or ditches where infiltration is the primary means to manage stormwater. The buffers mentioned above provide an additional level of protection of those surface water resources combined with control measures discussed in this section. Site specific characteristics will be used to modify and/or implement control measures as appropriate.

4.3 Other Controls

Figures 3 and 4 show the layout of the project. Ground disturbing activities are the primary source of pollutant (sediment) from the project. Sediment will be removed before it accumulates to one half of the above ground height of the control.

The following briefly describes the typical perimeter controls that will be used adjacent to the disturbance areas to lessen the impacts of stormwater run-off from this site:

- Straw bales and sediment fencing will be used to manage stormwater around the perimeter of the disturbance boundary where appropriate.
- Water bars, rolling dips, and ditches will be incorporated into the construction of the access ramps where needed to manage run-off properly.

Exact locations of all required BMPs and sediment control features will be field fit based on the layout shown on **Figure 3**. GM Endomines Idaho, LLC personnel will regularly assess the effectiveness of the BMPs and modify them as needed. Field-fit BMP installations (type and locations) will be depicted on Figure 4. ETH 5/8/18

Site inspections will be completed and will identify any particular area where BMPs should be implemented **Appendix B** (Form B).

Sediment Track-Out

The project area is located in remote forested areas serviced by unimproved roads. Sediment tracking will not be an issue for the project.

Stockpiled Sediment or Soil

Any soil present in the area, associated with the disturbance activity, will be incorporated into perimeter berms and other locations within the proposed disturbance area. Minimal soil is anticipated to be available and/or stored for this project. The soil material will be located within the area managed by the planned BMPs during ground disturbing activities and will be maintained during the exploration activities.

Sediment Basins

GM Endomines Idaho, LLC does not plan to use sediment basins to manage stormwater from the project. If sediment basins are deemed appropriate they will be designed properly and in accordance with Part 8.G.4.1.6.

Minimize Dust

In the event periods of dry weather occur during exploration activities, it may become necessary to spray water on the disturbance areas to control dust. GM Endomines Idaho, LLC will apply water at the appropriate level to control dust while minimizing run-off from disturbed ground.

Minimize the Disturbance of Steep Slopes

The project is located in mountainous terrain geologic systems that are targeted for mineral development and tend to be in steeper terrain. The project layout will be designed to minimize development of activities in steep areas; however, it is unavoidable in all situations. Appropriate control measures for steeper terrain will be implemented that will reduce and/or minimize erosion potential due to these types of conditions.

Soil Compaction

Soil compaction will be addressed as part of final closure. Since there is minimal soil in the proposed activity area, this will not be a significant issue.

Site Stabilization

In the event that exploration activities temporarily or permanently cease, GM Endomines Idaho, LLC will take appropriate actions to ensure the site is left in a stable condition. Even if the site is temporarily inactive, regular inspections of the site will be conducted to ensure that the installed control measures are properly functioning. The following items are examples of temporary control measures that may be utilized to ensure stable conditions:

• Inspection/maintenance of sediment controls (water bars, rolling dips, sediment fence, etc.)

A log of stabilization efforts can be found in **Appendix B** (Form G), and will be updated periodically to aid in the routine inspection and maintenance efforts.

<u>Other</u>

Section 3.0 describes the industrial materials that will be used during exploration. BMPs are implemented and designed to reduce and/or eliminate pollutants from stormwater run-off from the disturbance areas. BMPs will be implemented prior to any ground disturbing activities. **Figure 3** shows the proposed BMPs and will be modified as appropriate based on site specific conditions found at each particular site.

The SWPPP provides guidance on protocols and procedures that will be established for employees and any subcontractors to ensure compliance with the SWPPP. In an effort to minimize stormwater pollution, appropriate inspection of BMPs and activities will be completed to ensure compliance and to determine if operating activity modifications are necessary.

The project has a small disturbance area that is subject to the provisions of the MSGP. As such, the company has minimized the potential issues related to stormwater management. GM will implement the minimum BMPs described as well as advanced BMPs; however, some of the advanced BMPs are likely not applicable to the project. In the event conditions exist after modifying activities and/or installed BMPs, treatment and/or other advanced BMPs will be implemented as appropriate and will be developed at that time.

4.4 Inspections and Assessments

Inspection requirements for the project fall under two sections under Part 8.G. Those are defined in 8.G.3.1 and 8.G.3.2 pertaining to the construction activities prior to mining and mining activities. For the purposes of this exploration program, mining activities are similar to the underground exploration work planned. Therefore, two inspection frequencies are necessary to meet Part 8 regulations. Inspections will be carried out specific to 8.G.4.4 (Earth Disturbing Activities Prior to Mining) and 8.G.7.

When construction first commences on the project, inspections will be completed as follows:

- At least once every 7 calendar days, or
- Once every 14 calendar days and within 24 hours of a storm event of 0.25 inches or greater; and
- Inspections will occur during working hours.

Once activities start on the project, there will be someone at the site to provide inspection coverage. If inspection frequency changes and occurs once every 14 days, monitoring of the rain events (>0.25 inches) will be monitored in Orogrande or a Snotel site that is in close proximity.

Once construction activities have been completed and mining activities (underground exploration work) commence, all disturbances will be subject to Part 8.G.7 inspection frequency. Crooked River is listed a Category 4a – Impaired with an approved TMDL. Under this condition the following inspection schedule will be followed:

• At least quarterly, unless weather conditions make the site inaccessible.

Inspections will cover the following:

- All disturbed areas;
- Control and pollution prevention measures;
- Stabilized areas;
- Material storage areas;
- Ditches, berms, infiltration areas, etc.; and
- Any points of discharge.

Inspections will assess the following:

- Assess if the controls are installed, operational, and working as intended;
- Whether any new or modified stormwater controls are needed;
- Conditions that could lead to a spill or leak;
- Visual signs of erosion/sedimentation at points of discharges;
- Discharge points quality and characteristic of the discharge; and
- Effectiveness of the control measures.

Inspection reports will be completed within 24 hours of the inspection and include the following:

- Inspection Date;
- Name and Title of Inspector(s);
- Summary of Inspection Findings;
- Rainfall amount that triggered the inspection (if applicable);
- Identify any areas unsafe to perform inspection and why;
- Documentation of any observed discharges;
- Evidence of pollution entering the drainage system;
- Observations of the physical conditions of outfalls and control measures;
- Additional control measures and/or corrective action required;
- Any instance of non-compliance;
- Signed by the person(s) completing the inspections; and
- Copy placed in the SWPPP.

Appendix B contains the inspection form to be used for the project.

4.5 Quarterly Visual Assessment Procedures

Part 8.G.3.2 requires quarterly samples to be taken from the stormwater outfalls. The design of the system is to reduce the potential for discharges to exist at the outfall into Crooked River and/or Quartz Creek. Using control measures, natural barriers, and dispersed flow design onto vegetative areas removed from the waters of the U.S., it is unlikely that samples can be taken each quarter as required.

An inspection of the area and control measures will be completed to capture any water discharged from the outfall, if it exists during the quarter. The visual assessment must be made:

- In a clean, colorless glass or plastic container and examined in a well-lit area;
- Collected as soon as practicable, preferably within 30 minutes of an event that would cause a discharge from the outfall, and documented as why it was not possible;
- For snowmelt during a period with a measureable discharge; and
- For storm events, on discharges that occur at least 72-hours (3 days) from the previous discharge. Documentation as to why the 72-hour storm interval is not required to be representative of the discharge.

The seasonality of precipitation and snowmelt will dictate when and if discharges occur during the quarter. It is likely that a 72-hour interval is needed for stormwater representativeness in this region.

The visual inspection will assess the following water quality characteristics:

- Color;
- Odor;
- Clarity;
- Floating solids;
- Suspended solids;
- Foam:
- Oil sheen; and
- Other Obvious indicators of stormwater pollution.

Corrective actions will be determined if evidence of stormwater pollution is found.

4.5.1 Quarterly Visual Assessment Documentation

Documentation of visual quarterly sampling efforts will include:

- Sample location(s);
- Collection date, time, and visual assessment time and date if different;
- Person collecting and performing the visual assessment and their signatures;
- Nature of the discharge (i.e. run-off or snowmelt);

- Results of observations of the stormwater discharge;
- Probable sources of observed stormwater contamination;
- Any issues with sampling within 30 minutes of when a discharge occurs; and
- A statement, signed, and certified.

Any corrective action taken will be completed and documented as appropriate.

4.5.2 Exceptions to Quarterly Visual Assessments

The project is located in a region where weather conditions vary significantly. The following will likely apply and be followed:

<u>Adverse Weather Conditions</u> – If weather does not allow a sample to be collected, a substitute sample during the next qualifying storm-event will be completed. Documentation of the situation precluding sampling (dangerous conditions, flooding, electrical storms, high winds, or other similar situations) will be completed.

<u>Climate with Irregularities Storm Run-off</u> - The project is in an area of irregular precipitation and run-off. The area does reach freezing temperatures and snow conditions as well as extended dry periods in the summer which will influence potential run-off situations.

<u>Areas Subject to Snow</u> – The area will receive snow and will likely have snowmelt run-off. Attempts will be made to sample and complete a visual assessment.

<u>Inactive and Unstaffed Sites</u> – The project may have periods of inactivity when the site will be unstaffed. <u>GM Endomines Idaho</u>, <u>LLC will not store any materials at the site to ensure this section applies. Quarterly visual inspections will resume when activities commence.</u>

Reduction in Inspection Frequency

A reduction in inspection frequency may be applicable under Part 8.4.4.4.2 for stabilized sites and or temporary/seasonal cessation of exploration activities. If the following conditions exist, GM Endomines Idaho, LLC will reduce inspections:

- Site has been stabilized;
- Seasonal conditions exist (summer/winter); or
- Temporary cessation occurs.

When disturbance has been temporarily/permanently stabilized in some manner to reduce sediment erosion inspections will be reduced. This could involve revegetation, increased sediment control measures, or other similar conditions.

The project is located in an area that could be considered semi-arid for a portion of the year. When these conditions exist, inspections will be reduced to monthly and within 24 hours of a rain event greater than 0.25 inches.

The site is also subject to freezing and snow conditions that will reduce potential for erosion and the need for inspections. Inspections will be suspended or reduced to once per month during these periods which will likely occur between the months of December and March of each year. Access to the site will be restricted under certain snow conditions. Under this situation and extended periods of frozen conditions, suspension of inspections will likely occur. Monitoring of weather (temperature and precipitation) from the Snotel Site will assist in assessing when conditions are suitable to resume reduced inspections.

Finally, temporary cessation of exploration activities will likely occur for extended periods of time. When this occurs; inspections of the controls and appropriate stabilization (if required) will be completed before reducing inspection to a once per month frequency. If the temporary cessation occurs coincidentally with seasonal conditions discussed above, suspension may occur under this scenario as well.

4.6 Monitoring

Benchmark monitoring is set under two provisions of the MSGP Part 6.2.1 and Part 8.G.8. Part 8.G.8 focuses on waste rock and overburden stockpiles and areas. Part 6.2.1 covers the remaining portion of the project.

4.6.1 Benchmark Monitoring (General Areas)

Benchmark monitoring for all areas except waste rock and overburden stockpile areas is covered in this section. Waste rock and overburden benchmark monitoring are covered in Section 4.6.4. The project is located in an area where climate will influence stormwater run-off due to seasonal rainfall and freezing/snow conditions. This will result in a modification of the sampling program as allowed under Part 6.1.6 of the MSGP.

Monitoring will occur during the following periods when applicable based on climate conditions as follows:

- January 1 March 31;
- April 1 June 30;
- July 1 September 30; and
- October 1 December 31.

Monitoring will commence the first quarter after the permit is authorized. Monitoring will be accomplished once per quarter when possible or modified to collect the same number of samples

required (min. of 4) per year. This is required to establish the benchmark conditions. Reporting of the data using NetDMR will be used even if no sample was able to be collected.

If the average of the four samples collected do not exceed the benchmark value for a specific parameter, then no further monitoring for that parameter is required for the term of the permit. **Table 9** shows the benchmark values that must be assessed for the first year of data.

Data Exceeding Benchmark Values

If certain parameters (average of the fours samples) exceed the benchmark value the following will occur:

- An assessment of modifications will be made to eliminate the exceedance of the benchmark value:
- Quarterly monitoring will continue to obtain four additional samples for which the average does not exceed the benchmark value; or
- Make a determination that no further pollutant reductions are technologically available and economically practicable and achievable in light of best industry practice to meet the technology-based effluent limits or are necessary to meet the water quality based effluent limitations in Part 2.1 and 2.2 of the MSGP; and
- Documentation of the rational to support the conclusion that no further pollutant reductions are achievable.

If, during the course of monitoring, it becomes clear that certain parameters will mathematically exceed the benchmark values before obtaining all four samples, a review of the control measures will be completed and corrective actions implemented (if applicable). A review of the control measures as described above will be followed and documented.

Natural Background Pollutant Levels

Following the first four quarterly samples of benchmark monitoring; if the average concentration of a pollutant exceeds a benchmark value and it is determined it is due to natural background condition, no corrective action will be taken or additional benchmark monitoring will be accomplished. The following will be followed:

- The average concentration of benchmark monitoring results are less than or equal to the concentration of that pollutant in the natural background; and
- Documentation of the information, rationale, and other information on background conditions.

Inactive and Unstaffed

Benchmark monitoring will not be accomplished if the site is inactive or unstaffed as no material will be stored at the site. Site stabilization will be accomplished and will follow Part 6.2.1.3 of the MSGP.

4.6.2 Impaired Stream Monitoring Requirements

Crooked River is impaired for temperature and water. There is an approved TMDL for Crooked River. No monitoring for temperature or water is anticipated as no specific pollutant is related to the TMDL goals.

4.6.3 Monitoring Documentation

Because of the stormwater management plan, it is not anticipated that a discharge will exist at the outfall into waters of the U.S. The SWPPP will be modified during the construction activities to better define the potential location of discharges that could enter waters of the U.S.

The sections above describe the frequency of monitoring, parameters and other information. The forms in **Appendix B** include all pertinent information to assist staff in assessing water quality and performance of the control measures.

The SWPPP will include weather monitoring information as part of the regular Routine Facility Inspection Reports (**Appendix B-Form B**) that will characterize the climate to support monitoring schedule changes for benchmark sampling and inspections.

4.6.4 Waste Rock and Overburden

Part 8.G.8 exempts benchmark monitoring of inactive or unstaffed sites. This project could be subject to this provision of the MSGP.

The project is subject to benchmark monitoring under Part 8.G.8.2 for waste rock and overburden piles. The following benchmark monitoring will occur:

- Once during the first year from waste rock/overburden piles discharges (**Table 9**); and
- Twice annually in subsequent years for any parameter that exceed the benchmark values.

The project is a gold and silver deposit and is not subject to analytical monitoring under Part 8.G.8.3

Table 9: Benchmark Parameter and Concentration List

Parameter	Benchmark Monitoring Concentrations
TSS	100 mg/l
Turbidity	50 NTUs
pН	6.0-9.0 s.u.
Hardness	No Benchmark Value
Total Antimony	0.64 mg/l
Total Arsenic	0.15 mg/l
Total Beryllium	0.13 mg/l
Total Cadmium	Hardness Dependent
Total Copper	Hardness Dependent
Total Iron	1.0 mg/l
Total Lead	Hardness Dependent
Total Mercury	0.0014 mg/l
Total Nickel	Hardness Dependent
Total Selenium	0.005 mg/l
Total Silver	Hardness Dependent
Total Zinc	Hardness Dependent

Note: Receiving water hardness will dictate benchmark values – See Table 8.G-2 MSGP for metal/hardness values

5.0 Endangered, Threatened Species, and Critical Habitat

An assessment of these elements was completed as part of the development of the SWPPP and Notice of Intent. The action area was developed to cover the proposed project area and was larger than the proposed disturbance. An IPac Resource Trust Report was completed. **Appendix E** contains the information required under Part 1.1.4.5 of the MSGP.

There are no federally listed or endangered species in the action area and no critical habitat is present in the area. Therefore, the project falls under Criterion A.

Stormwater Pollution Prevention Plan (SWPPP) General Mining, LLC - Friday Exploration Project

6.0 Historic Properties

A review of Appendix F of the MSGP was completed to determine the applicability of historic properties on the project site. The project is located on patented mining claims with existing disturbance from previous exploration activities. The area associated with the control measures is very small and will be located on lands that have been disturbed in the past.

Based on previous exploration disturbance on private lands over the years and the small nature of the disturbance associated with the control measures, there is no potential to affect historical properties at this site. Criterion B is applicable to this project.

Stormwater Pollution Prevention Plan (SWPPP)

General Mining, LLC - Friday Exploration Project

Endomines Idaho, LLC -ETH 5/8/18

7.0 Certification and Notification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name:	Title:
Signature:	Date:
Name: Zachary Black	Title: Technical Director / President
Signature	Date: